

Notice of Allowability

Application No.

10/625,348

Examiner

Sharidan Carrillo

Applicant(s)

BRESLIN ET AL.

Art Unit

1746

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to Amendment filed 10/11/2005.
2. ☒ The allowed claim(s) is/are 2-8, 10-24, 26-31.
3. ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 - a) ☐ All b) ☐ Some* c) ☐ None of the:
 1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

* Certified copies not received: _____.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.

THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

4. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
 5. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
 - (a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached
 - 1) ☐ hereto or 2) ☐ to Paper No./Mail Date _____.
 - (b) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date _____.
- Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).
6. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

1. ☒ Notice of References Cited (PTO-892)
2. ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3. ☐ Information Disclosure Statements (PTO-1449 or PTO/SB/08), Paper No./Mail Date _____
4. ☐ Examiner's Comment Regarding Requirement for Deposit of Biological Material
5. ☐ Notice of Informal Patent Application (PTO-152)
6. ☐ Interview Summary (PTO-413), Paper No./Mail Date _____
7. ☒ Examiner's Amendment/Comment
8. ☒ Examiner's Statement of Reasons for Allowance
9. ☐ Other _____


SHARIDAN CARRILLO
PRIMARY EXAMINER

EXAMINER'S AMENDMENT

1. An examiner's amendment to the record appears below. Should the changes and/or additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR 1.312. To ensure consideration of such an amendment, it MUST be submitted no later than the payment of the issue fee.

Authorization for this examiner's amendment was given in a telephone interview with Mr. Warren Haines on 12/08/2005.

The application has been amended as follows:

Claim 5: line 1, after "fluid" insert –is a carrier for the non-wetting agent and –

Claim 6: line 6, before "salts" insert –molten--

Claim 10: line 8, delete "graphite, coal, coke, and other"

Claim 24: line 2, delete "at least some of"

Claim 27: line 2, before "non-wetting" insert –the—

Claim 31: line 1, before "non-wetting" insert –the—

The following is an examiner's statement of reasons for allowance: The prior art fails to teach removing molten metal from a surface, wherein the fluid is a non-wetting agent for the metal or carries a non-wetting agent for the metal and the fluid is a liquid selected from the group consisting of molten zinc, lead, tin, antimony and mixtures or alloys thereof, and molten salts. The prior art further fails to teach the molten metal comprising aluminum or alloys thereof and the non-wetting agent selected from the group consisting of boron nitride, barite, cryolite, fluorite, aluminum titanate, barium

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carbonate, wollastonite, calcium silicate, sodium chloride/potassium chloride mixture, flour, talc, carbon and mixtures thereof. The prior art further fails to teach cleaning a metal ceramic composite material by applying a fluid which is a non-wetting agent for the metal or carries a non-wetting agent from the metal, the fluid removing molten metal from the metal/ceramic composite. The prior art fails to teach wiping the surface with a refractory cloth coated with graphite or powdered carbon to remove the molten metal. .

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

In an interview with Mr. Warren Haines, on 12/8/2005, the examiner proposed amending the claims to correct minor 112, second paragraph issues.

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. The prior art of Van Horn teaches cutting molten metals, particularly ferrous metals using an air carbon arc. However, there is no teaching of removing aluminum molten metals. Miller teaches a method of air-carbon arc cutting. Miller further teaches the need to remove carbon dust during the cutting operation by applying vaporized water on the carbon electrode tip. There is no teaching or suggestion of using the method of Miller to remove molten metal, wherein the molten metal is aluminum or alloys thereof.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Sharidan Carrillo whose telephone number is 571-272-

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1297. The examiner can normally be reached on M-W 6:30-4:00pm, alternating Thursday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael Barr can be reached on 571-272-1414. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Sharidan Carrillo
Primary Examiner
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bsc



SHARIDAN CARRILLO
PRIMARY EXAMINER